

Docket No.: 42390.P13390

AMENDMENTS TO THE CLAIMS

Listing of claims:

1. (Original) An integrated circuit package comprising:

a printed circuit board having a ground ring connected to a ground plane of the printed circuit board;

a non-metal connector attached to the printed circuit board within the ground ring;

a metal casing substantially enclosing the printed circuit board but not enclosing the non-metal connector, the metal casing having a metal lip that makes physical and electrical contact with the ground ring of the printed circuit board.
2. (Original) The integrated circuit package of claim 1 wherein the metal casing further comprises:

a first metal portion that substantially covers a top surface of the printed circuit board; and

a second metal portion that substantially covers a bottom surface of the printed circuit board.
3. (Original) The integrated circuit package of claim 2, wherein the second metal portion comprises a heat sink having a plurality of fins.

Docket No.: 42390.P13390
Appl. No.: 10/033,688

Docket No.: 42390.P13390

4. (Original) The integrated circuit package of claim 2, wherein the first metal portion makes electrical contact with a first perimeter ground ring on the top surface of the printed circuit board, the first perimeter ground substantially circling the top surface of the printed circuit board, the first perimeter ground ring being electrically coupled to the ground plane.
5. (Original) The integrated circuit package of claim 4, wherein the second metal portion, makes electrical contact with a second perimeter ground ring on the bottom surface of the printed circuit board, the second perimeter ground ring substantially circling the bottom surface of the printed circuit board, the second perimeter ground ring being electrically coupled to the ground plane.
6. (Original) The integrated circuit package of claim 5, wherein the first perimeter ground ring is coupled to the second perimeter ground ring by a plurality of vias spaced intermittently around the first and second perimeter ground rings.
7. (Original) A transmitter comprising:

a printed circuit board having a top surface and a bottom surface, the top surface having a first perimeter ground ring, and the bottom surface having a second perimeter ground ring, the first perimeter ground ring substantially circling the top surface of the printed circuit board, the second perimeter ground ring substantially circling the bottom surface of the printed circuit board;

Docket No.: 42390.P13390
Appl. No.: 10/033,688

5

Docket No.: 42390.P13390

a first metal casing substantially covering the top surface of the printed circuit board, the first metal casing being in electrical contact with the first perimeter ground ring; and

a second metal casing substantially covering the bottom surface of the printed circuit board, the second metal casing being the electrical contact with the second perimeter ground ring.

8. (Original) The transmitter of claim 7 further comprising:

a plurality of vias electrically coupling the first perimeter ground ring with the second perimeter ground ring.

9. (Original) The transmitter of claim 7 comprising:

a ground ring on the top surface of the printed circuit board;

a non-metal connector coupled to the top surface of the printed circuit board, within the ground ring, wherein the first metal casing surrounds a perimeter of the non-metal connector and makes electrical contact with the ground ring.

10. (Original) The transmitter of claim 7, wherein the second metal casing has fins and serves as a heat sink.

11. (Original) The transmitter of claim 7, wherein the first metal casing at least partially overlaps a perimeter of the second metal casing.

12. (Original) The transmitter of claim 7, wherein the second metal casing at least partially overlaps a perimeter of the first metal casing.

Docket No.: 42390.P13390

6

Appl. No.: 10/033,688

Docket No.: 42390.P13390

13. (Original) A method of reducing EMI from a transceiver, the method comprising:

attaching a non-metal connector to a printed circuit board having a ground ring;

surrounding the printed circuit board with a metal shield except for the non-metal
connector, the metal shield making physical and electrical contact with the
ground ring.
14. (Original) The method of claim 13 further comprising:

inserting an electrically conductive gasket between the metal shield and the
ground ring.
15. (Original) The method of claim 13, wherein surrounding the printed circuit board
with a metal shield further comprises:

covering a top surface of the printed circuit board with a first metal casing having
an opening for the non-metal connector; and

covering a bottom surface of the printed circuit board with a second metal casing.
16. (Original) The method of claim 15, wherein covering the top surface of the
printed circuit board further comprises:

making electrical contact between the first metal casing and a first perimeter
ground ring circling the top surface of the printed circuit board.
17. (Original) The method of claim 16 further comprising:

Docket No.: 42390.P13390
Appl. No.: 10/033,688

Docket No.: 42390.P13390

inserting an electrically conductive gasket between the first metal casing and the first perimeter ground ring.

18. (Original) The method of claim 15, wherein covering the bottom surface of the printed circuit board further comprises:

making electrical contact between the second metal casing and a second perimeter ground ring circling the bottom of the surface of the printed circuit board.

19. (Original) The method of claim 18 further comprising:

inserting an electrically conductive gasket between the second metal casing and the second perimeter ground ring.

Docket No.: 42390.P13390
Appl. No.: 10/033,688

8